

Notes 10/30 - Composition with Evaluation

■ Do what's on the inside first

$$f(x) = x^2 - 3x + 1 \quad g(x) = 2x + 5$$

Ex 1: $g[f(4)] = (g \circ f)(4)$

$$\downarrow \quad \hookrightarrow f(4) = 4^2 - 3(4) + 1 \\ = 16 - 12 + 1 = 5$$

$$g[5] = 2(5) + 5 = \textcircled{15}$$

Ex 2: $f[g(3)] =$

$$g(3) = 2(3) + 5 = 11$$

$$f(11) = 11^2 - 3(11) + 1 \\ = 121 - 33 + 1 = \textcircled{89}$$